

“With the MIYABI concept we were able to get more imaging information during complex procedures under the same anesthetic. This improves workflow and avoids two procedures”

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## Taking Care of Children

Pediatric cardiology has always been a special field with special requirements. Reduced radiation exposure and state-of-the-art imaging are required to treat complex cases such as hypoplastic left heart syndrome. The MIYABI concept combines MRI and angiography systems from Siemens Healthcare to optimize these procedures.

Unlike other medical disciplines there has been a long and productive relationship between the pediatric cardiologist and cardiovascular surgeon, together focusing on improving the lives of children with congenital heart lesions. This cooperative spirit found its origins, when in November 1944, Dr. Alfred Blalock, encouraged by Dr. Helen Taussig, performed the first arterial shunt, setting the stage for a revolution in cardiac care. That spirit continues today in very specialized centers dealing with congenital heart disorders like The Hospital for Sick Children in Toronto, Canada. With the development of percutaneous techniques for cardiovascular interven-

tion, treatment plans have evolved that utilize the unique attributes of what at first may seem like competitive specialties, but have come together, as Taussig did with Blalock, to develop new techniques and management strategies. The case presented on the following pages is one such contemporary example, that of management of the newborn with hypoplastic left heart syndrome. The treatment algorithm was bilateral pulmonary artery banding and placement of a ductal stent in a hybrid surgical angiography suite, with prior cardiac MR imaging, and transfer on Siemens Miyabi system from the MRI scanner to the hybrid room for angiography.

With this system combination, workflow is streamlined, all anatomical data is available prior to the surgery and the complete treatment can be done under the same anesthetic. The MIYABI concept offers flexibility for system usage, as both systems can be operated separately as well. But when used together, they become a very powerful high-performance interventional system. The availability of two imaging technologies during interventional procedures and the convenient way to move the patient from one system to the other quickly and easily supports an optimized treatment and gives seriously ill children new hope.